

CLAIMS

1. A ceramic heater unit comprising at least a heater and electrodes for passing electricity through said heater to elevate the temperature of the heater, characterized in that said heater and said electrodes are respectively made of a material containing silicon carbide, and said heater and said electrodes are integrally constructed with use of a binder made of a material containing silicon carbide.

2. The ceramic heater unit of claim 1, further comprising a susceptor placed on a work-facing surface of said heater and made of a material containing silicon carbide.

3. The ceramic heater unit of claim 1 or 2, further comprising a reflecting plate placed below the surface other than the work-facing surface of said heater and made of a material containing silicon carbide.

4. The ceramic heater unit of any one of claims 1 to 3, further comprising an insulating plate placed being interposed between said heater and said reflecting plate.

5. The ceramic heater unit of any one of claims 1 to 4, wherein the constituent members of said ceramic heater unit are housed in a case.

6. The ceramic heater unit of any one of claims 1 to 5, wherein said heater and said electrodes are integrally constructed by the reaction sintering method with use of the binder made of a material containing silicon carbide in the part that joins the two.